

Department of Energy Savannah River Operations Office Safety Management System (SMS) Description Manual



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CHANGE SUMMARY LOG

Description of Change	Effective Date
<p>This revision cancels SRM 400.1.1A and discusses the following:</p> <ul style="list-style-type: none">• how DOE-SR implements the Integrated Safety Management System,• the DOE-SR directives that reflect the ISMS processes and requirements,• identifies other policies, procedures, manuals and directives where various mechanisms used in safety management are located,• addresses changes needed as the result of the DOE-SR reorganization (elimination of the Workforce Capabilities Council, Integrated Safety Management Team, Workforce 21, etc.),• changes made to the methods of administration and oversight feedback of the Managing and Operating (M&O) contract (elimination of Annual Operating Plan, Senior Execution Guide, Award Fee, etc.), and• the need to recognize the NNSA safety management responsibilities.	1-12-05

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TITLE: SAFETY MANAGEMENT SYSTEM DESCRIPTION MANUAL

1.0 PURPOSE AND SCOPE

1.1 PURPOSE

1.1.1 The purpose of this Manual is to describe the Department of Energy (DOE) Savannah River Operations Office (SR) Safety Management System (SMS). This Manual provides an overview describing how various parts of the safety management system fit together. Specific requirements for each of the SMS core functions and principles are set forth in other implementing procedures and manuals. This Manual relies upon the following DOE-SR directives to provide the description and specifics of SMS actions involving radiological waste management, fire protection and environmental management systems:

- Savannah River Manual (SRM) 435.1, "DOE-SR Radioactive Waste Management Manual", provides DOE-SR personnel with instructions for implementing the requirements of DOE Order 435.1, "Radioactive Waste Management", to ensure that all radioactive waste is managed in a manner that is protective of workers and public health and safety and the environment.
- Savannah River Implementing Procedure (SRIP) 440.1, "DOE-SR Fire Protection", establishes the DOE-SR fire protection program required by DOE O 420.1 and DOE O 440.1 to support and maintain a level of fire protection and fire suppression capability sufficient to minimize losses from fire and related hazards.
- SRIP 450.1, "DOE-SR Environmental Protection Program", establishes the responsibilities of and the methods to be used by DOE-SR personnel in providing direction and oversight for the effective management of the Environmental Protection Program at the Savannah River Site (SRS), a program that ensures activities and work performed at SRS comply with requirements and regulations and are conducted in an environmentally safe and sound manner.
- DOE-SR is organized to do work through contracts. Some of the processes and procedures used to perform DOE-SR safety management functions are those that belong to its contractors. These processes and procedures, such as the Unresolved Safety Question (USQ) Procedure, Standards and Requirements Identification Documents (S/RIDS), Radiation Protection Plan (RPP), Occurrence Reporting System (ORPS), and the Remote Worker Program are DOE-SR approved and/or under its oversight. These processes and procedures are included in the description of the DOE-SR SMS. A full description of these contractor processes and procedures is provided in the contractors' Integrated Safety Management System (ISMS) description documents, S/RIDS, and various other procedures.

1.2 SCOPE

- 1.2.1 DOE-SR has overall responsibility for the SRS. In the performance of this responsibility, DOE-SR exercises its authority to establish and enforce occupational safety and health standards applicable to work conditions of the contractor and subcontractor employees performing work at the SRS. DOE-SR accomplishes this by ensuring formal arrangements are developed to authorize work to be performed at the SRS. Additionally, DOE-SR performs compliance oversight of SRS activities to ensure these requirements for performing work are being adhered to. These formal arrangements are the starting point for achieving safe work by establishing an adequate safety framework and commitments to performing work safely. A safety framework provides the requirements for integrating the management of environment, safety, and health functions and activities into the processes for planning and executing work.
- 1.2.2 The provisions of this manual apply to all DOE-SR organizational elements. The provisions of this document also apply to the National Nuclear Security Administration – Savannah River Site (NNSA-SRO) as defined in the Memorandum, Wilmot to Allison, U. S. DOE-SR Directives System, 11-19-03; the 8-15-03 Agreement on Safety Management at Savannah River Site signed by Manager, DOE-SR and Manager, SRSO; and the DOE-SR Functions, Responsibilities, and Authorities Procedure (FRAP) (SRM 300.1.1B). NNSA-SRO adopts those DOE-SR directives, as necessary, to accomplish their assigned safety management functions. The Manager, DOE-SR, must agree to any change made by NNSA-SRO involving the safety management system, including authorization basis, safety analysis, safety documentation, and safety-class procedures. NNSA-SRO is an active member of the DOE-SR Executive Technical Management Board (ETMB), DOE-SR Nuclear Safety Council, and the DOE-SR Facility Representative Council (FRC).
- 1.2.3 Currently, all safety management functions, responsibilities, and authorities for the NNSA Fissile Materials Disposition Office (NA-266) reside at DOE-HQ Office of Fissile Materials Disposition (NA-26). NA-26's respective contracts for performing work at SRS specify the legal requirements to apply integrated safety management to the contract related work.

2.0 REFERENCES

2.1 SOURCE REQUIREMENT DOCUMENTS

- 2.1.1 SRIP 223.4, "DOE-SR Technical Assessment Program"
- 2.1.2 SRIP 251.2, "Oversight of Contractor S/RID Activities"
- 2.1.3 SRIP 421.1, "Nuclear Safety Oversight"
- 2.1.4 SRM 130.2.1, "Management Plan for Planning, Budgeting, Work Authorization, and Control"

- 2.1.5 SRM 300.1.1, Chapter 1, Section 1.1, "DOE-SR Functions, Responsibilities and Authorities Procedure"
- 2.1.6 SRM 300.1.1, Chapter 1, Section 1.2, "DOE-SR Organizational Configuration Control Process"
- 2.1.7 SRM 300.1.1, Chapter 2, Section 2.1, "DOE-SR Position Management and Classification Process"
- 2.1.8 SRM 300.1.1, Chapter 3, Section 3.1, "Merit Promotion and Placement Process"
- 2.1.9 SRM 300.1.1, Chapter 5, Section 5.2, "DOE-SR Performance Management Process"
- 2.1.10 SRM 300.1.1, Chapter 6, Section 6.1, "Technical Training and Qualification Program"
- 2.1.11 SRM 435.1, "Radioactive Waste Management Manual"

2.2 INTERFACE DOCUMENTS

- 2.2.1 M&O Contract Number DE-AC09-96SR18500, Modification Number M-100
- 2.2.2 Memorandum, Golan to Allison, Delegation of Authority, dated 8-12-04
- 2.2.3 DOE M 411.1-1, Safety Management, Functions, Responsibilities, and Authorities Manual
- 2.2.4 Department of Energy Office of Environmental Management Safety Management Functions, Responsibilities, and Authorities Document, Revision 3

3.0 ACRONYMS (This manual utilizes the following acronyms):

AA	Authorization Agreements
DOE	Department of Energy
DNFSB	Defense Nuclear Facilities Safety Board
DSA	Documented Safety Analysis
ETMB	Executive Technical Management Board
FR	Facility Representative
FRAP	Functions, Responsibilities, and Authorities Procedure
FRC	Facility Representative Council
HQ	Department of Energy-Headquarters
ISMS	Integrated Safety Management System
KPI	Key Performance Indicators
M&O	management and operating
NNSA	National Nuclear Security Administration
OEIT	Organizational Evaluation and Improvement Team
OHCM	Office of Human Capital Management

SERs	Safety Evaluation Reports
SR	Savannah River Operations Office
SRS	Savannah River Site
TQP	Technical Qualification Program
TSR	Technical Safety Requirement
USQ	Unreviewed Safety Question
WA/EP	Work Authorization/Execution Plan
WSI	Wackenhut Services, Incorporated
WSRC	Westinghouse Savannah River Company

4.0 **BACKGROUND**

In 1995, the Defense Nuclear Facilities Safety Board (DNFSB) recommended that DOE institutionalize an integrated safety management system (ISMS) across the complex. DOE responded to that recommendation (DNFSB Recommendation 95-2) by issuing an implementation plan in April 1996, followed by DOE P 450.4, "Safety Management System", in October 1996.

DOE's ISMS establishes a hierarchy of components facilitating the orderly development and implementation of safety management throughout the complex. As described in DOE P 450.4, the SMS consists of six components: (1) objective, (2) guiding principles, (3) core functions, (4) mechanisms, (5) responsibilities, and (6) implementation. The first three are the same for all DOE offices and contractors, while the latter three differ from site to site depending on hazards, work processes, and management styles.

4.1 **SAFETY MANAGEMENT SYSTEM OBJECTIVE**

- 4.1.1 The objective of safety management is to ensure that DOE-SR and its contractors systematically integrate safety into management and work practices at all levels so that missions are accomplished while protecting the worker, the public, and the environment. The bottom-line objective is to **DO WORK SAFELY**.
- 4.1.2 The DOE-SR Functions, Responsibilities, and Authorities Procedure (FRAP) is a key component of the configuration control process for the assignment of safety management functions, responsibilities and authorities, as well as, providing the identification of the DOE-SR directives which implement them. The DOE-SR FRAP, SRIPs, SR policies (SRPs), SRMs, and the SMS Description Manual are controlled and maintained current through the DOE-SR Directives System. The Organizational Evaluation and Improvement Team (OEIT), Office of Human Capital Management (OHCM), includes these documents in their independent assessment process to ensure they remain up to date and properly implemented.
- 4.1.3 SRIP 440.3, "DOE-SR Federal Employee Occupational Safety and Health (FEOSH) Program", implements the requirements of 29 Code of Federal Regulations (CFR) 1960, "Basic Program Requirements for FEOSH Programs and Related Matters", and is directly applicable to office work performed by Federal workers at SRS. Many of the DOE-SR employees also perform work outside an office environment.

This work takes place in facilities and areas that are covered by the contractor's health and safety plans, programs, and procedures. DOE-SR employees are responsible to be familiar with the hazards and be compliant with the work practices identified by the contractor for entry into these facilities and areas.

- 4.1.4 Integrated safety management of SRS activities approved by DOE-SR starts with a proper legal foundation that clearly articulates and enforces the responsibilities and expectations for establishing and maintaining a safe environment to perform work in an environmentally compliant manner. All work conducted at the SRS must be accomplished in a manner that protects the public, the workers, the environment, and its security assets and related materials.
- 4.1.5 While a number of different contractual and non-contractual arrangements are used by DOE-SR to authorize work at the SRS, all arrangements are common in their requirement for a safety framework to be established and followed to ensure the associated work is performed safely. All authorizing documents (e.g., contracts, interagency agreements, and cooperative agreements) must clearly state the commitment to safety as a primary consideration and must require the establishment of a safety framework to ensure work is performed safely. Additionally, these authorizing documents require organizations authorized to perform work at the SRS to flow down these safety requirements to their subcontractors and other arrangements they are allowed to enter into to perform work. DOE-SR authority to perform unannounced inspections of work activities and to issue a "Stop Work" order is maintained in all arrangements that authorize work to be performed.
- 4.1.6 For DOE-SR contracts, a defined safety framework shall be included. This is accomplished through the application of Federal Acquisition Requirements (FAR) and DOE Acquisition Requirements (DEAR) to the contracting process. DOE-SR validates the safety framework. Safe performance of work is the responsibility of the contractor regardless if the work is performed directly or through others via subcontracts or other arrangements. DOE-SR contracts require a contractor to flow down contract requirements and in specific safety requirements to all subcontracts and other arrangements that perform work through others.

Examples:

- A. **DOE-SR M&O contract with WSRC** - WSRC is required to have a safety framework that is provided by an ISMS. The WSRC ISMS is validated and approved by the Manager, DOE-SR. The WSRC contract clauses state that WSRC is responsible for the safe performance of all its work including work accomplished through others (e.g., subcontractors, vendors, etc.) and for the flow down of contract requirements to these arrangements. WSRC maintains DOE-SR's authority to perform unannounced inspections and to issue a "Stop Work" order for all of its arrangements to perform work.

B. DOE-SR Glass Waste Storage Building No. 2 Project - the safety framework is developed and approved as an integral part of the Project Execution Plan (PEP) in accordance with DOE O 413.3. The Federal Project Manager is responsible to tailor the safety framework and validate its implementation to meet the needs of the project as it transitions through its various phases. The construction phase has commenced with a DOE-SR construction contract with KROG that includes the PEP developed safety framework for this phase. The contract establishes that safe performance of the work is the responsibility of KROG regardless if they perform the work directly or through others (e.g., subcontractors, vendors, etc.) and for the flow down of contract requirements to these arrangements. KROG maintains DOE-SR's authority to perform unannounced inspections and to issue a "Stop Work" order for all of its arrangements to perform work.

4.1.7 For DOE-SR non-contractual arrangements utilized to authorize work on the SRS, a defined safety framework shall be included in the agreement. These formal agreements (e.g., interagency agreements, cooperative agreements, etc.) specify the commitment to safety by the organization being authorized to conduct work, the authority of DOE-SR to perform unannounced inspections of work being conducted, and DOE-SR's authority to issue a "Stop Work" order. Additionally, safe performance of work is the responsibility of the organization approved to perform work regardless if the work is performed directly or through others via subcontracts or other arrangements. DOE-SR non-contractual arrangements require an organization approved to perform work to flow down contract requirements, and in specific safety requirements to all subcontracts and other arrangements that perform work through others.

Example:

A. DOE-SR Interagency Agreement with the United States Forest Service (USFS)
- the USFS is required to have a safety framework that establishes safety programs that are compliant with Occupational Safety and Health Agency's requirements applicable to the work being performed. The USFS is responsible for maintaining compliance to their safety framework. DOE-SR performs periodic inspections of USFS work to verify compliance with the requirements of the interagency agreement. The interagency agreement states that the USFS is responsible for the safe performance of all its work including work accomplished through others (e.g., subcontractors, vendors, etc.) and for the flow down of contract requirements to these arrangements. USFS maintains DOE-SR's authority to perform unannounced inspections and to issue a "Stop Work" order for all of its arrangements to perform work.

4.1.8 Contractors and subcontractors, having short-term (typically one year or less) contracts which have distinct scopes of work (e.g., construction), will have contracts that clearly define safety expectations in a level of detail commensurate with the nature of the work and its associated hazards.

- 4.1.9 All long-term (typically multi-year) arrangements having a less distinct scope of work, which include contracts such as the Westinghouse Savannah River Company (WSRC) management and operating (M&O) contract, the Wackenhut Services Incorporated (WSI) service contract, the USFS interagency agreement, the University of Georgia cooperative agreement to manage and operate the Savannah River Ecology Laboratory (SREL), as well as NNSA activities at SRS, are required to comply with DOE-SR policies for establishing safe work environments and conducting environmentally sound operations. This commitment is achieved and documented by the signatures of the managers of these organizations in SRP-04-04, "Savannah River Site Workplace Safety, Health, and Security Policy" and SRP-04-03, "Savannah River Site Environmental Management System Policy". The commitment to these policies is renewed on a yearly basis. Copies of the policies and the commitment signatures are posted in prominent areas across the site. The privatized activities of South Carolina Electric and Gas in D-Area and the Three Rivers Run Landfill are subject to oversight and enforcement of safety regulations directly by the Occupational Safety and Health Administration.

5.0 GUIDING PRINCIPLES

- 5.1 The seven guiding principles discussed below are the fundamental policies guiding DOE-SR and contractor actions. DOE-SR's implementation of each guiding principle is discussed in Section 6.0 of this Manual.
- 5.1.1 **Line Management Responsibility for Safety.** An effective safety management system must ensure that line management is directly responsible for protection of the public, workers, and the environment.
- 5.1.2 **Clear Roles and Responsibilities.** An effective safety management system must ensure that clear and unambiguous lines of authority and responsibility for safety are established and maintained at all organizational levels within the DOE and its contractors.
- 5.1.3 **Competence Commensurate with Responsibilities.** An effective safety management system must ensure that personnel possess the experience, knowledge, skill and abilities necessary to discharge their responsibilities.
- 5.1.4 **Balanced Priorities.** An effective safety management system requires that resources be appropriately allocated to address safety, programmatic, and operational considerations. Protecting the public, workers, and the environment shall be a priority when work activities are planned and performed.
- 5.1.5 **Identification of Safety Standards and Requirements.** An effective safety management system requires that before work is performed, associated hazards are evaluated and safety standards and requirements are established. Safety standards and requirements should provide adequate assurance that, if they are properly implemented, the public, workers, and environment will be protected from adverse consequences.

- 5.1.6 **Hazard Controls Tailored to Work Being Performed.** An effective safety management system requires that administrative and engineering controls designed to prevent and mitigate hazards be tailored to the work being performed and the associated hazards.
- 5.1.7 **Operations Authorization.** An effective safety management system requires that the conditions and requirements that must be satisfied for operations to begin and continue be clearly established and agreed upon.

5.2 CORE FUNCTIONS FOR INTEGRATED SAFETY MANAGEMENT

The five core safety management functions identified below provide the structure for integrating safety management with any work activity that could potentially affect the public, workers, or the environment. The functions are applied as a continuous cycle, with the degree of rigor appropriate to address the type of work activity and hazards involved. DOE-SR's implementation of the core functions is discussed in detail in Section 6.0 of this Manual.

- 5.2.1 **Define Scope of Work.** Missions are translated into work, expectations are set, tasks are identified and prioritized, and resources are allocated.
- 5.2.2 **Analyze Hazards.** Hazards associated with work are identified, analyzed, and categorized.
- 5.2.3 **Develop and Implement Hazard Controls.** Applicable standards and requirements are identified and agreed upon, controls to prevent or mitigate hazards are identified, the safety envelope is established, and controls are implemented.
- 5.2.4 **Perform Work within Controls.** Readiness is confirmed and work is performed safely.
- 5.2.5 **Provide Feedback and Continuous Improvement.** Feedback information on the adequacy of controls is gathered, opportunities for improving the definition and planning of work are identified and implemented, line and independent oversight is conducted, and, if necessary, regulatory and enforcement actions occur.

5.3 INTEGRATED SAFETY MANAGEMENT MECHANISMS

Safety mechanisms define how the core safety management functions are implemented. At SRS, policies, procedures and manuals are the principal mechanisms for implementing the site SMS. These mechanisms may be prepared and approved at the DOE-HQ level (DOE policies and orders); prepared by DOE-SR and approved by DOE-HQ (when authority is not delegated to the Field Office Manager); prepared and approved at the DOE-SR level (e.g., SRIPs, SRMs, SRIPs); prepared by the contractor and approved by DOE-SR (e.g., S/RIDs and DSAs); or prepared and approved at the contractor level. Mechanisms may vary from facility to facility and activity to activity, based on the associated hazards and the work being performed.

5.4 RESPONSIBILITIES FOR INTEGRATED SAFETY MANAGEMENT

Responsibility for safety must be clearly defined in documents that can be linked to specific work activities. An overview of DOE responsibilities for safety management is provided in DOE M 411.1-1C, "Safety Management Functions, Responsibilities, and Authorities Manual". These responsibilities are further defined and supplemented by DOE-HQ program office and operations office functions, responsibilities, and authorities documents. In addition, specific responsibilities flow down from Departmental directives to site-specific implementing directives. Contractor responsibilities are defined in contracts, regulations, and contractor-specific procedures.

5.5 IMPLEMENTATION OF INTEGRATED SAFETY MANAGEMENT

- 5.5.1 Implementation refers to development and application of ISMS mechanisms to specific work activities. At SRS, these mechanisms are primarily implemented through site-level programs. Using the WSRC M&O contract as an example, as shown in Figure 1, integrated safety management is implemented at SRS through an overarching and structured process for the conduct of work under that contract.

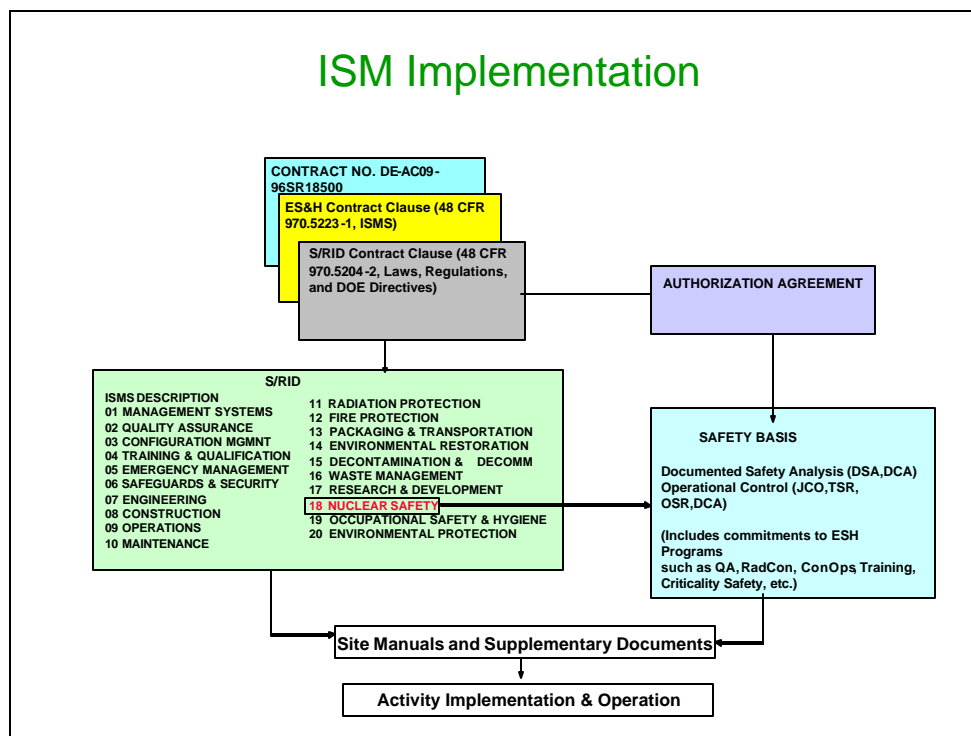


Figure 1. SRS WSRC Safety Management System Implementation

- 5.5.2 The WSRC ISMS description document specifically addresses the current WSRC managing and operating (M&O) contract. A similar configuration is in place for the WSI security contract. DOE-SR also has the option to directly manage projects, such as the Glass Waste Storage Building #2 project. These projects are conducted following the DOE-HQ requirements for project management (see SRM 410.1.1, "Project Management Manual").

As such, they provide their own functions, responsibilities, and authorities assignments, as well as, establish a graded approach implementing integrated safety management. These are captured in the PEP and through their contract which specifies the legal requirements to apply ISMS to the contract-related work. This provides the assigned Federal Project Manager greater flexibility to tailor the project's SMS to accommodate changing needs as the project progresses through its execution phases. In either of these arrangements, the DOE-SR Manager approves the ISMS to be used.

The need to integrate ISMS requirements among multiple SRS activities approved by DOE-SR is accomplished by providing in a contract or non-contract arrangement of concern, a clause requiring this integration. This requirement may be satisfied through establishment of interfacing agreements (e.g., Memorandums of Understanding and/or Memorandums of Agreement (MOU/MOA)). Tailoring, in accordance with the DOE directives and Department of Energy Acquisition Requirements (DEAR) clauses for establishing ISMS, will be applied to DOE-SR contracts. If a new contract is established that requires a change to the performance of a DOE-SR safety management function not addressed in the SMS Description, the decision to incorporate the change in this manual or prepare a separate document will be made prior to awarding the contract.

6.0 IMPLEMENTATION OF INTEGRATED SAFETY MANAGEMENT AT DOE-SR

This section describes how integrated safety management is implemented at DOE-SR for each of the seven guiding principles and five core functional areas.

6.1 DOE-SR IMPLEMENTATION OF THE SEVEN GUIDING PRINCIPLES

6.1.1 Principle 1: Line Management Responsibility for Safety

- Primary DOE-SR Procedural Mechanism:
 - SRM 300.1.1, Chapter 1, Section 1.1, "DOE-SR Functions, Responsibilities and Authorities Procedure"

Discussion: At DOE-SR, assignment of line management's responsibility for safety is accomplished via SRM300.1.1, Chapter 1, Section 1.1. Part 1 of this procedure addresses the safety management functions identified in DOE M 411.1-1C, EM FRA, program office functions, responsibilities, and authorities documents, other pertinent functions, responsibilities and authorities delegated to the DOE-SR Manager, and identifies which DOE-SR organization is responsible for each SMS action. The processes for executing SMS actions are delineated in DOE-SR implementing procedures (SRIPs, SRPs, SRMs), and other activity and program-specific documents. Part 1 of the DOE-SR FRAP also identifies the applicable process for the assigned SMS action. Part 2 summarizes the assignment of applicable SMS actions of Part 1 and groups them by responsible individual Assistant Managers and/or Office Directors. Specific examples of DOE-SR line management's responsibility for safety include the approval of Safety Basis documents and line authority to stop work.

6.1.2 Principle 2: Clear Roles and Responsibilities

- Primary DOE-SR Procedural Mechanism:
 - SRM 300.1.1, Chapter 1, Section 1.1, “DOE-SR Functions, Responsibilities and Authorities Procedure”
 - SRM 300.1.1, Chapter 2, Section 2.1, “DOE-SR Position Management and Classification Process”
 - SRM 300.1.1, Chapter 5, Section 5.2, “DOE-SR Performance Management Process”

Discussion: At DOE-SR, Parts 1 and 2 of the SRM 300.1.1, Chapter 1, Section 1.1, “DOE-SR Functions, Responsibilities and Authorities Procedure”, establish clear roles, responsibilities, and delegations of authority for each Assistant Manager and/or Office Director, down to the division level. Specific roles and responsibilities are further clarified as appropriate in SRIPs and SRMs, which may specify roles, responsibilities, and levels of authority for specific work activities and functions.

- The Position Management and Classification Process procedure (SRM 300.1.1, Chapter 2, Section 2.1,) establishes the review and validation steps required for assuring that clear roles and responsibilities for safety are identified in position descriptions and are aligned with the organizational mission and functions in the DOE-SR FRAP. Supervisors utilize this process to ensure position descriptions (PDs) are properly developed for identifying and assigning safety management responsibilities to employees. The process requires that employees acknowledge that their assigned PD is correct and that they are responsible for and will be evaluated on the successful accomplishment of the actions assigned to them.
- Using the Performance Management Process procedure (SRM 300.1.1, Chapter 5, Section 5.2), supervisors establish performance and development expectations for employees accomplishing assigned responsibilities. The procedure specifies the minimum supervisor/employee interface periods (mid-year and annually) to provide performance evaluation feedback and identify opportunities for improvement based on the employees' success in accomplishing work activities. This process ensures an ongoing confirmation that clear roles and responsibilities are maintained.

6.1.3 Principle 3: Competence Commensurate with Responsibilities

- Primary DOE-SR Procedural Mechanisms:
 - SRM 300.1.1, Chapter 1, Section 1.2, “DOE-SR Organizational Configuration Control Process”
 - SRM 300.1.1, Chapter 3, Section 3.1, “Merit Promotion and Placement Process”

- SRM 300.1.1, Chapter 5, Section 5.2, "Performance Management Process Procedure"
- SRM 300.1.1, Chapter 6, Section 6.1, "DOE-SR Technical Training and Qualification Programs"
- SRM 300.1.1, Chapter 6, Section 6.2, "DOE-SR Training and Continuing Education Process"

Discussion: The DOE-SR manual (SRM 300.1.1) is a collection of procedures that describe the processes for implementing the Human Capital Management System functions. These procedures, discussed in the paragraphs below, identify the assignment of functions and responsibilities; requirements for controlling organizational changes; designing the workforce structure; identifying competencies; developing positions and personnel; and, staffing positions that are responsible for executing assigned or delegated SMS functions with competent personnel. These human resource management processes for establishing, evaluating, and continuing the improvements of employee competencies for accomplishing their assigned tasks ensure the safe accomplishment of the DOE-SR mission.

- The DOE-SR Performance Management Process procedure (SRM 300.1.1, Chapter 5, Section 5.2) requires each employee to meet with his/her supervisor to develop an annual Individual Training Plan (ITP) containing qualification activities tailored to their specific job duties. The requirement for an annual ITP applies to all employees to ensure that employee competence is not only maintained, but continually enhanced. Based on work assignments, DOE-SR employees may also participate in the DOE-SR Technical Qualification Program (TQP).
- The Merit Promotion and Placement Process procedure (SRM 300.1.1, Chapter 3, Section 3.1) ensures the systematic and consistent selection of qualified candidates for promotion and placement into line management positions which could impact DOE-SR's ability to safely oversee the operations of the Site. The results of this process validate that line management has staffed positions with competent and qualified employees with the necessary skills to execute organizational SMS functions.
- The Position Management and Classification Process procedure (SRM 300.1.1, Chapter 2, Section 2.1) ensures that competencies required for the position align with the organizational responsibilities of the organization. DOE-SR utilizes this systematic approach to determining the number of positions needed; the skills, knowledge, and competencies required to successfully perform the safety functions and duties of the positions; and the grouping and assignment of duties and responsibilities to achieve maximum efficiency and economy in the workforce.
- DOE-SR has established an ETMB, further discussed in Section 6.2.6. The ETMB is primarily responsible for guiding DOE-SR plans and actions in the areas of improvement and maintenance of the technical capability of the Federal workforce and the site's Technical Assessment and Facility Representative (FR) Programs. The ETMB leads the development and implementation of strategies and action plans involving the preservation and improvement of DOE-SR capabilities.

The ETMB provides necessary line organizations support for qualification/re-qualification activities as well as review for endorsement of functional qualification standards for new TQ positions and new senior technical safety management positions.

- The FRC oversees the FR Qualification Program at DOE-SR. An approved charter governs the operations and activities of this Council.
- The DOE-SR TQP, also monitored by the ETMB, is a rigorous qualification program specifically designed to ensure technical competency commensurate with job responsibility. Every DOE-SR senior manager with responsibilities that may impact nuclear facility safety must qualify as a Senior Technical Safety Manager (STSM) under this program. In addition, DOE-SR currently has employees participating in the TQP. They maintain qualification in functional areas such as nuclear safety systems, mechanical systems, fire protection, environmental compliance, chemical processing, facility maintenance management, waste management, radiation protection, and safeguards and security.
- DOE-SR's representative to the Federal Technical Capability (FTC) Panel, the FTC Agent, is responsible for the oversight, evaluation, and direction of the DOE-SR TQP. The FTC Agent solicits information and feedback from line management regarding the improvement of technical capability of the DOE-SR workforce. The FTC Agent seeks support from senior management regarding the successful implementation of the FTC program at DOE-SR and monitors other safety management activities. The FTC Agent participates in the recruitment and selection of STSMs and is actively involved in the oversight function for submittal of STSM status reports to DOE-HQ. The FTC Agent oversees implementation of the DOE-SR TQP and participates in and oversees TQP assessments.
- The DOE-SR 5-Year Workforce Management Plan identifies the resources and capabilities required for continued operations and accelerated cleanup. It identifies the critical technical capabilities required to address safety, programmatic, and operational considerations. DOE-SR has implemented a "defense-in-depth" strategy to assure that more than the minimum required personnel are qualified at all times to ensure no disruptions of safe operations. When skill shortfalls supporting these areas are identified, the Plan identifies the process for staffing these critical positions.
- Additionally, during periods of change, such as realignments or re-organizations, the DOE-SR Organizational Configuration Control Process procedure (SRM 300.1.1, Chapter 1, Section 1.2) provides for effective organizational changes and mitigates breakdowns in the assignment of safety related work necessary to accomplish the mission. This process ensures effective transition of accountability for safety related functions if organizational changes are required.

6.1.4 Principle 4: Balanced Priorities

- Primary DOE-SR Procedural Mechanisms:
 - DOE O 430.1B, "Real Property Asset Management"
 - DOE P 430.1, "Land and Facility Use Planning"
 - SRM 130.2.1*, "Management Plan for Planning, Budgeting, Work Authorization and Control"

Discussion: Protecting the workers, the public, and the environment is a top priority whenever the DOE plans and performs work. Critical to achieving this priority is providing adequate resources and ensuring that those resources are effectively allocated. DOE-HQ and DOE field elements establish a method for ensuring a proper balance among competing priorities (e.g., budget, schedule, safety, and quality).

The Office of Environmental Management (EM) Closure Planning Guidance (issued June 1, 2004), is a document that turns initiatives from the "top-to-bottom review" into formal processes that can predictably deliver results and safely complete cleanup of the EM program by 2035. This document serves as a guide for a 5-year period and will provide consistency as well as linkage among the "top-to-bottom review", the Integrated Planning, Accountability, and Budget System-Information System and EM's reports to congress, as well as the DOE-HQ Strategic Plan.

Planning is a key component in ensuring that SRS has a system in place to effectively balance mission priorities. The DOE-HQ Strategic Plan reflects a restructured environmental cleanup program developed from an intensive "top-to-bottom review" that emphasized the need to reduce risk rather than manage it. The aggressive new cleanup strategy emphasizes doing more real work, greater accountability, increased competition, and innovative cleanup methods. Using the DOE-HQ Strategic Plan as a foundation, DOE-SR's planning process employs a systematic and integrated approach to ensure that all work scope is identified to support the various site missions. The products of this planning are the DOE-EM Ten-Year Site Plan, the DOE-SR EM PMP, and the contracts that execute actions of the PMP.

- Sitewide integrated planning complies with DOE O 430.1B, "Real Property Asset Management" and DOE P 430.1, "Land and Facility Use Planning". DOE O 430.1B requires the development of a DOE-SR Ten-Year Site Plan for non-closure sites. This plan is a comprehensive sitewide plan that addresses all requirements to support the Department's strategic plan, programmatic and/or detailed organization mission plans, and other planning and programmatic guidance. It also identifies associated safeguards and security plans. Programmatic and/or detailed organization mission plans are also developed, linking strategic planning elements and objectives to more specific scopes of work.

- Contract Modification No. M100 has defined work scope for the M&O contract through the end of the contract period. DOE-SR monitors contractor performance through implementation of the Performance Evaluation and Measurement Plan and Contract Management/Oversight Plan. The environmental management work scope was defined and agreed to through development of the Contract Performance Baseline. Formal change control processes have been implemented for both scopes of work and are described in detail in the DOE-SR Management Plan for Planning, Budgeting, Work Authorization and Control (SRM 130.2.1*). DOE-SR's process for defining scope of work, translating mission needs into work, setting expectations, allocating resources, authorizing and controlling work, and reporting results is also described in SRM 130.2.1*. The Manager, DOE-SR, has designated and chartered a Baseline Configuration Control Board to ensure the proper definition, coordination, evaluation, and disposition of proposed changes to the SRS Contract Performance Baseline and EM program elements under configuration control of the DOE-HQ EM Configuration Control Board. The Baseline Configuration Control Board also reviews proposals to reallocate funds. The objective is to ensure each change document, Baseline Change Proposal or Request for Equitable Adjustment, submitted by the contractor is reviewed and evaluated using appropriate criteria and approved at the appropriate level of management.

* SRM 130.2.1 is currently in revision. Interim measures are in place until this directive is updated.

6.1.5 Principle 5: Identification of Safety Standards and Requirements

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 251.2, "Oversight of Contractor S/RID Activities"
 - SRIP 251.3, "Preparation and Approval of DOE-SR Directives"
 - WSRC-RP-94-1268 (the SRS S/RID)
 - 48 CFR 970.5204-2, "Laws, Regulations and DOE Directives"

Discussion: At SRS, the Standards/Requirements Identification Document (S/RID) contains the environmental, safety, and health standards and requirements applicable to all work conducted by the site's M&O contractor. The S/RID was initially approved in August 1995, but the development and approval process took full advantage of the order compliance process ongoing at SRS since 1990. S/RID development started with a conservative set of requirements initially focused on DOE Orders of interest to the DNFSB and was later expanded to include other state and Federal regulations and standards, and additional requirements as appropriate. The original S/RID was developed and reviewed by the contractor's subject matter experts, regulatory compliance staff, functional area managers, and line management at the highest levels and submitted to DOE-SR. After a thorough review by program and line management organizations and resolution of comments, the S/RID was approved by the Manager, DOE-SR. New requirements or directives are identified by DOE-SR and transmitted to the M&O contractor for incorporation in the S/RID. All S/RID changes are reviewed and approved by DOE-SR. This review and approval process is subject to formal change control requirements. The S/RID is a living document and is invoked by the contract. The contractor is expected to maintain, revise, and update the S/RID as appropriate to reflect changes to source documents, changes in site missions, and changes resulting from operating experience, lessons-learned, and site re-engineering initiatives. S/RID requirements are sorted into 20 functional areas and assigned to applicable facility categories. The mechanics of the S/RID and its organization is provided in WSRC-RP-1268-001, Functional Area 01, "Management Systems". This same process applies to the site security contract. Other non-M&O contracts that are less complex in nature or limited in scope may invoke standard Federal Acquisition Requirements and Department of Energy Acquisition Requirements safety contract clauses and requirements of 48 CFR directly from the contract without the use of an S/RID process.

- The S/RID identifies requirements and standards applicable to the design, construction, operation, and decommissioning of defense nuclear and non-nuclear facilities. In November 1998, the requirements of DOE P 450.4, "Safety Management System", were incorporated into the S/RID, Functional Area 01, "Management Systems" (WSRC-RP-94-1268-001). Each S/RID requirement is incorporated into applicable contractor management control documents such as policies and procedures, specifying the specific actions and conditions necessary to ensure compliance (see Figure 2 next page). Compliance assessments are performed by DOE-SR (as part of its oversight and assessment programs) and by contractors (as part of their ongoing self-assessment program), to determine whether procedures specify the actions and conditions necessary to ensure compliance.

WSRC compliance assessment results are provided electronically as updates to S/RID Tables 2 and 3 (see Figure 3 below) and are available on ShRINE.

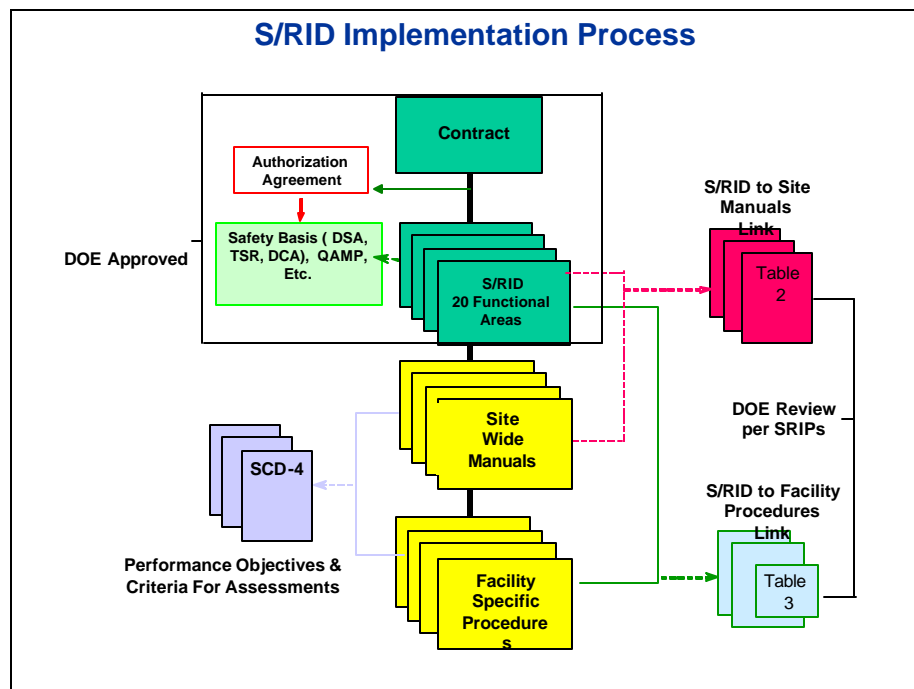


Figure 2 - S/RID Process

S/RIDs - Table 1

WESTINGHOUSE SAVANNAH RIVER COMPANY	Report:	WSRC-RP-94-1286-018 REVISION 97-12
STANDARD/REQUIREMENTS IDENTIFICATION DOCUMENT	Functional Area:	18 NUCLEAR SAFETY
	Date:	Table 1 - Page 18 1286-018

S/RID Requirement Number	Source Document	Source Requirement Number	Requirement Text	WSRC Applicability								Phase 1 Compliance Approval	
				Nuclear and Radiological				Non-Nuclear					
				Hazard	Support	Rad- con	Other Rad	Facility Specific	General	Facility Specific	Common		
18.06.091	ANS 8.19	7.7	Deviations from operating procedures and off-normal alterations in process conditions that affect nuclear criticality safety shall be documented, reported to management, and investigated promptly. Action shall be taken to prevent recurrence.										X
18.06.092	ANS 8.19	8.2	The nuclear criticality safety evaluation shall determine and explicitly identify the controlled parameters and their associated limits upon which nuclear criticality safety depends.										X

Table 2

S/RID Number	Document Number	Requirement Number	Implementing WSRC Management Controls	Phase 1 Programmatic Compliance Conclusion	Phase 2 Administrative Compliance Conclusion	Comment and/or Reference to Requirement for Approval (if any)
	Document	Section	Item	Document	Section	Item
18.06.091	25	1.3	9	None Necessary		
ANS 8.19	25	1.3	9			15.03.01.01
7.7						p

Table 3

S/RID Number	Document Number	Requirement Number	Implementing WSRC Management Controls	Phase 1 Programmatic Compliance Conclusion	Phase 2 Administrative Compliance Conclusion	Comment and/or Reference to Requirement for Approval (if any)
	Document	Section	Item	Document	Section	Item
18.06.091	See Table 2	1.3	9	A-11	A-11	15.03.01.01
ANS 8.19				1.1	1.1	p
7.7						

Figure 3 - S/RID Tables 1, 2 and 3

These tables can be found on ShRINE at <http://bnet4.srs.gov/srid/navmain.asp>

- The order compliance process, precursor to development of the S/RID, remains in place for DOE-SR personnel (described in SRIP 251.3, "Preparation and Approval of DOE-SR Directives"). Compliance with DOE Orders of interest to the DNFSB that are applicable to the performance of work by DOE-SR personnel is documented in Order Compliance Assessment Matrices. In some cases, DOE-SR personnel are required by policy to comply with established contractor procedures, such as those for occupational safety and radiological protection. In most cases, however, DOE-SR policies and manuals provide detailed site-specific implementing requirements for DOE-SR personnel (see Figure 4 below). Implementing procedures and policies for both DOE and contractor are readily available electronically through the Site information network (SHRINE).

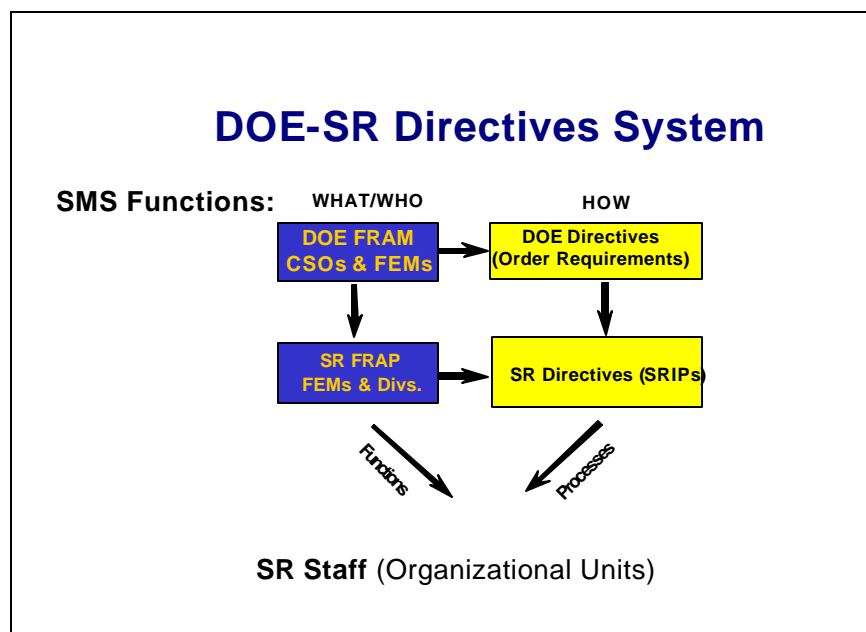


Figure 4 - DOE-SR Directives System

6.1.6 Principle 6: Hazard Controls Tailored to Work Being Performed

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 421.1, "Nuclear Safety Oversight"
 - SRIP 450.4, "Authorization Agreements"

Discussion: DOE-SR's graded approach ensures that as hazards increase, increasing controls are put in place to prevent and mitigate activity-specific hazards. For example, SRS facilities are categorized by hazard: high-hazard facilities must have a comprehensive Documented Safety Analysis (DSA), less hazardous facilities utilize a less comprehensive DSA, and low-hazard facilities require only an Auditable Safety Analysis. In addition, depending on the hazards associated with a particular job, an extensive Process Hazards Review, or a less extensive Job Hazards Analysis, may be utilized.

- Responsibility for hazard analysis and development and approval of operational controls derived from hazard analyses of non-nuclear facilities rests with the operating contractor, with periodic oversight by DOE-SR personnel. For high-hazard nuclear facilities, DOE-SR utilizes formal Authorization Agreements (AA) (per SRIP 450.4), incorporating the results of DOE-SR reviews of the contractor's proposed safety basis for a defined scope of work. AAs are developed in conjunction with startup (or restart) approval by DOE-HQ, approval of safety basis documents by DOE-HQ, or any other direction provided to the contractor that alters the scope of operations, special terms, or conditions specified by DOE-HQ.

6.1.7 Principle 7: Operations Authorization

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 450.4, "Authorization Agreements"
 - SRIP 425.1, "Nuclear Facility Startup Approval Process"

Discussion: The contract between DOE-SR and its contractors constitutes the basic agreement by which all work is performed. S/RID requirements (discussed in Section 6.1.5) define the process for analyzing hazards and "developing hazard controls". For the majority of activities conducted at SRS, the base M&O contract and contract modification number M100, as supplemented by the contractor's WA/EP, Contract Performance Baseline, and S/RID requirements, serves to authorize operations. However, for some high-hazard activities, such as Hazard Categories 1 and 2 nuclear facilities, DOE recognized the need for an additional specific document authorizing operations. AAs (described in SRIP 450.4) are documented agreements between DOE-SR and its contractor for high-hazard facilities. The AA contains key terms and conditions where the contractor is authorized to perform work and incorporates DOE-SR's review of the contractor's proposed safety basis for a defined scope of work. "Safety Basis" includes aspects of facility design and operational requirements relied upon by DOE to authorize operation, and which are described in documents such as facility DSAs, hazard classification documents, Technical Safety Requirements, and DOE-issued Safety Evaluation Report (SERs). DOE recognized that depending upon the governing document, there may be differences in the scope of work or range of operations. For example, DOE may have issued a Record of Decision affecting scope of operational activities in a facility that may differ from the scope of operational activities defined in the current Contract Performance Baseline, and may differ from the scope of operational activities that was analyzed by the DSA. The AA reconciles any differences into a single integrated set of conditions and requirements for operation. Although specifically designed for Hazard Categories 1 and 2 facilities, DOE-SR may elect to utilize AAs in special situations for lower hazard activities if their use is warranted due to the complexity of the work and control required.

- The DOE-SR process for development, review, and approval of AAs and Facility Startup Approval are defined in SRIP 450.4 and SRIP 425.1, respectively.

6.2 DOE-SR IMPLEMENTATION OF THE FIVE CORE FUNCTIONS

6.2.1 Core Function 1: Define Scope of Work

- Primary DOE-SR Procedural Mechanisms:
 - DOE O 430.1B, "Real Property Asset Management"
 - DOE P 430.1, "Land and Facility Use Planning"
 - SRM 130.2.1, "Management Plan for Planning, Budgeting, Work Authorization and Control"

Discussion: SRM 130.2.1*, "Management Plan for Planning, Budgeting, Work Authorization and Control", describes DOE-SR's process for defining the scope of work, translating mission needs into work, setting expectations, prioritizing tasks, allocating resources, authorizing and controlling work, and reporting results. Strategic planning is the first step in defining work scope. DOE-HQ maintains a Strategic Plan establishing goals and direction for each DOE business line and focus area. Utilizing the DOE-HQ Strategic Plan (see Section 6.1.4 for a detailed discussion of the "top-to-bottom review", the EM Closure Planning Guidance, the DOE-HQ Strategic Plan, and the DOE-SR PMP), DOE-SR translates strategic objectives and elements into site-level, programmatic, and/or detailed organization mission plans through the defined planning process. Plans such as the SRS EM Program Performance Management Plan, the SRS EM Integrated Deactivation and Decommissioning Plan, the Risk Based End State Plan, and the Comprehensive Cleanup Plan are a few examples of plans developed in support of strategic objectives.

- DOE-SR uses the Contract Performance Baseline, supplemented by the WA/EP, to translate objectives of the strategic plans into definable work scope and provide strategic and outyear planning guidance to the M&O contractor. For effective planning, WA/EP and Contract Performance Baseline development and updates are aligned with the budget formulation and execution cycle.
- The WA/EP and the Contract Performance Baseline serves as execution documents for each fiscal year's work at SRS. Both documents define work scope, schedules (milestones), performance measures, and resources (estimated manpower and costs) for the fiscal year. These documents also serve as a collection point for all fiscal year performance measures and milestones from higher-tier and program-specific planning documents.
- For non-M&O type contracts, which are less complex in nature, the work scope is specifically defined by DOE-SR in the basic contract or task orders issued under the contract.

* SRM 130.2.1 is currently in revision. Interim measures are in place until this directive is updated.

- The Management Plan for Planning, Budgeting, Work Authorization and Control (SRM 130.2.1*) also defines the formal process for changing work scope. The purpose of change control is to ensure that baseline changes exceeding defined thresholds are approved by appropriate management officials prior to initiation of work. The change control process also ensures that baselines are not changed unless associated with a change to scope (i.e., milestone due dates and estimated costs cannot be changed unless driven by a DOE-directed scope change).

6.2.2 Core Function 2: Analysis of Hazards

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 421.1, "Nuclear Safety Oversight"
 - SRIP 251.2, "Oversight of Contractor S/RID Activities"

Discussion: SRIP 421.1, "Nuclear Safety Oversight", establishes requirements for DOE-SR oversight of contractor nuclear safety programs and related activities, including hazard analyses. This procedure documents that DOE-SR uses S/RIDs to establish the level of hazard analysis and documentation required for all site activities. Except for nuclear facilities, responsibility for development and approval of auditable hazard analyses rests with the site M&O contractor.

- Safety Analysis is a documented process that includes systematic identification and assessment of hazards posed by a nuclear facility or operation. For nuclear facilities, DOE-SR personnel review facility safety documentation, including hazards analyses, facility classifications, unreviewed safety questions (USQs), and structures, systems, and components classifications. DOE-SR issues SERs documenting review of contractor safety documentation and the basis for approval of the safety basis documents. DOE-SR line organizations continuously monitor and assess contractor processes for identifying, analyzing and categorizing facility and activity hazards. DOE-SR line personnel oversee management of the technical baseline for all facility process and safety systems and conduct surveillances on contractor engineering organizations in support of operations. This ensures that safety documentation accurately reflects the plant/system technical basis and that required safety evaluations are performed. Test plans and test procedures are verified to ensure they accurately reflect plant configuration and to ensure that test acceptance personnel evaluate the performance of contractor engineering organizations as part of operations support. Review and approval of the DSA by DOE-SR requires development of a SER. This process is defined in SRIP 421.1 (Nuclear Safety Oversight).

* SRM 130.2.1 is currently in revision. Interim measures are in place until this directive is updated.

6.2.3 Core Function 3: Develop and Implement Hazard Controls

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 421.1, "Nuclear Safety Oversight,"
 - SRIP 450.4, "Authorization Agreements"

Discussion: SRIP 421.1, "Nuclear Safety Oversight", documents that the responsibility for the development and approval of operational controls derived from hazard analyses of non-nuclear facilities rests with the site M&O contractor. For high-hazard nuclear facilities, DOE developed the concept of AAs, incorporating the results of DOE-SR reviews of the contractor's proposed safety basis for a defined scope of work.

- The AA contains key terms and conditions (controls and commitments) under which the contractor is authorized to perform work. Any changes to these terms and conditions require DOE approval. In many respects, an AA parallels the license issued by the Nuclear Regulatory Commission for operation of commercial nuclear facilities. Unless specifically exempted by the DOE-SR Manager, AAs are required for all SRS high-hazard activities. AAs are developed in conjunction with startup (or restart) approval by DOE, approval of safety basis documents by DOE, or any other direction provided to the contractor that alters the scope of operations, special terms, or conditions specified by DOE.
- The safety basis consists of the facility design basis and operational requirements relied upon by DOE to authorize operation and is described in documents including the facility DSA and other safety analyses, hazard classification documents, Technical Safety Requirements (TSRs), DOE-issued SERs, and other facility-specific commitments made to ensure compliance with DOE procedures.
- TSRs are important safety basis documents that define the conditions, safe boundaries, and the management or administrative controls necessary to ensure the safe operation of a nuclear facility. TSR controls are also designed to reduce potential risk to workers and the public from uncontrolled releases of radioactive materials or from radiation exposures due to inadvertent criticality. TSRs include safety limits, operating limits, surveillance requirements, administrative controls, use and application instructions, and their bases, in support of the facility DSA. The TSR constitutes an agreement or contract between DOE and the facility operating management regarding the safe operation of the facility.
- USQ Evaluations are also important in maintaining the integrity of safety basis documents. An USQ exists if one or more of the following conditions result: (1) the probability of the occurrence or the consequences of an accident or the malfunction of equipment important to safety previously evaluated in the DSA could be increased; (2) the possibility for an accident or malfunction of a different type than any previously evaluated in DSA could be created; and (3) a margin of safety could be reduced; or (4) the DSA may not be bounding or may be otherwise inadequate. Inherent in an activity resulting in an USQ is the need for additional controls to be approved by DOE-SR, necessitating a change to the facility safety basis.

DOE-SR oversight of the contractor's USQ program ensures the safety basis approved by DOE remains current and provides adequate level of protection to workers, the public, and the environment.

6.2.4 Core Function 4: Perform Work Within Controls

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 421.1, "Nuclear Safety Oversight"
 - SRIP 430.1, "Facility Representative Program"
 - SRIP 223.4, "DOE-SR Technical Assessment Program"
 - SRIP 425.1, "Nuclear Facility Startup Approval Process"

Discussion: DOE-SR's mission is to provide leadership, direction, and oversight to ensure that site programs, operations, and resources are managed in an open, safe, secure, environmentally-sound, and cost-effective manner. SRIP 421.1, "Nuclear Safety Oversight", establishes requirements for DOE-SR oversight of contractor nuclear safety programs and related activities. SRIP 421.1 documents that in general, DOE-SR's nuclear safety oversight of the contractor includes (a) maintaining a continuous presence and awareness of contractor activities involving nuclear facilities and operations, and their associated safety basis, and identifying, communicating, and resolving nuclear safety issues; (b) performing technical assessments of nuclear safety programs and activities; and (c) reviewing and approving applicable compliance packages, AAs, safety basis documents, and USQ documentation.

- DOE-SR maintains operational awareness of contractor work activities primarily through FRs, as well as Facility Technical Specialists and Site Technical Specialists. In accordance with SRIP 430.1, "Facility Representative Program", FRs spend most of their time observing and assessing contractor operations via operational awareness and performance-based assessments. DOE-SR FRs are formally qualified as part of the TQP, subject to continuing education requirements, and must qualify on a facility-specific basis.
- DOE P 450.5, "Line Environment, Safety, and Health Oversight", also establishes that key DOE field office responsibilities include maintaining operational awareness, conducting reviews and assessments in support of operational readiness and verification, and conducting for-cause reviews as necessary. DOE P 450.5 also describes a periodic, value-added appraisal of sufficient frequency and duration to confirm the contractor's safe performance of work and the effectiveness of the self-assessment program. Currently, DOE-SR performs this function as part of the technical assessment program, with smaller assessments being conducted throughout the year. DOE-SR is developing a process to institutionalize a larger, periodic appraisal directly tied to the requirements of DOE P 450.5.

- SRIP 223.4, "DOE-SR Technical Assessment Program", details the assessment processes for DOE-SR technical staff to monitor contractor performance to ascertain facility and program status, determine whether implementation of requirements is effective, and evaluate the effectiveness of the contractor's self-assessment program. A technical assessment is defined as an evaluation of contractor performance based on awareness of contractor work activities, data analysis, and comparison to the results of the contractor's self-assessment. The DOE-SR consolidated annual assessment plan categorizes assessments by S/RID functional area, by organization, and by assessment type (required, prudent management, or reactive). DOE-SR technical assessments are performance-based, focusing heavily on results and effectiveness in addition to ascertaining compliance with requirements.
- At DOE-SR, "for-cause" reviews can occur for a variety of reasons, including accident investigations, technical assessments, and management walkthroughs. SRIP 223.4 (Technical Assessment Program) provides guidance for one form of for-cause review, the "reactive assessment". Reactive assessments and other "for-cause" reviews are conducted whenever there is a perception that an area needs to be examined more closely. The trigger may be an adverse trend, an abnormal event at SRS or another site, resulting in an occurrence report, environment, safety and health issues, or judgment of the cognizant line or program manager.
- DOE-SR is also responsible for performing reviews and assessments in support of contractor readiness assessments and operational readiness reviews. SRIP 425.1 documents the process for DOE-SR review and approval of nuclear facility startups and restarts.

6.2.5 Core Function 5: Provide Feedback and Continuous Improvement

- Primary DOE-SR Procedural Mechanisms:
 - SRIP 223.5, "DOE-SR Self Assessment Program"
 - SRM 300.1.1, Chapter 5.2, "DOE-SR Performance Management Process"
 - SRIP 430.1, "Facility Representative Program"
 - SRIP 223.4, "DOE-SR Technical Assessment Program"
 - SRIP 420.1, "DOE-SR Notification to the Contractor of an Adverse Condition/Stop Work Order"
 - SRM 414.1.1, "Quality Assurance Program Manual"
 - M&O Contract Number DE-AC09-96SR18500, Modification Number M100, DOE-SR and NNSA-SRSO "Performance Evaluation and Measurement Plan and Contract Management/Oversight"

Discussion: Two primary mechanisms exist for DOE-SR self-assessment. DOE-SR conducts management assessments, which are self-assessments conducted by managers of the activities under their purview. In addition, the OHCM/OEIT conducts independent assessments of DOE-SR organizations and activities as required by SRM 414.1.1, "Quality Assurance Program Manual".

Additionally, supervisors provide performance feedback to the staff by performing job performance evaluations/job performance ratings in accordance with SRM 300.1.1, Chapter 5, Section 5.2 (Performance Management Process). This process ensures that the staff's performance and development plans (P&DP) accurately capture the DOE-SR Organizational Performance Management Plan elements and that they are being satisfactorily performed. DOE-HQ also monitors SRS performance through selected performance indicators and technical assessments (typically assembling a team including HQ staff, Federal, and contractor staff from other DOE sites and outside consultants).

Outside organizations, such as the DNFSB and the South Carolina Department of Health and Environmental Control, also assess SRS activities and provide valuable feedback. Some of these assessment activities result in recommendations for improvement; others could result in fines or penalties if performance is not satisfactory. The DOE-SR Organizational Performance Management Plan is modified, as necessary, to incorporate improvements identified through these processes/sources.

- Numerous formal and informal mechanisms exist to obtain and communicate feedback on DOE-SR and contractor activities (see Figure 5 below.).

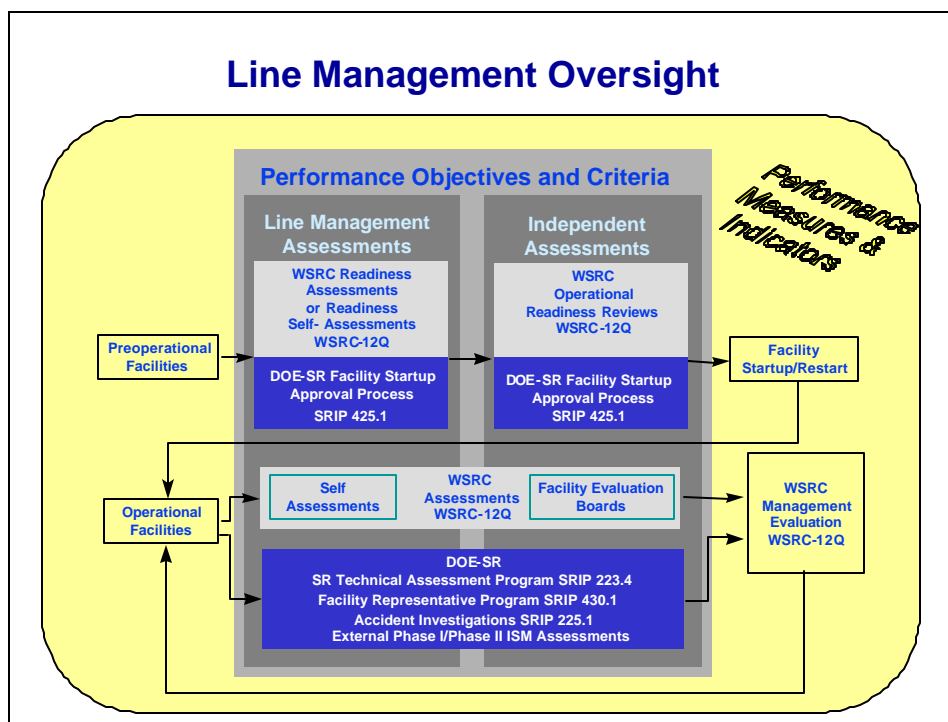


Figure 5 - SRS Assessment Model

Specifics of the organizational structure, roles, and responsibilities of Federal personnel for the M&O contract management and oversight are provided in the Performance Evaluation and Measurement Plan, Part I of III of the M&O Contract Modification Number M100.

DOE-SR FRs observe facility operations and provide real-time informal and formally documented feedback related to facility operations and program implementation. Facility Technical Specialists and Site Technical Specialists conduct technical assessments of activities under their cognizance, and assessments serve as a formally documented source of feedback to the contractor. Technical Assessments include evaluation of any applicable contractor self-assessments. Results of this evaluation are documented in the assessment and also provided to the DOE-SR program manager overseeing the contractor self-assessment program. DOE-SR management walkthroughs provide another perspective on facility operations and program implementation.

Special DOE-SR assessments, including Readiness Assessments, Operational Readiness Reviews, and Safety Basis Document Reviews also evaluate contractor performance and are sources of feedback information. Other activities, ranging from surveillances and document reviews to task team participation, may serve as feedback sources. Feedback may be generated by employees raising concerns outside their chain of command through use of the site Employee Concerns Programs. Employee concerns are investigated and pertinent feedback information is provided to the appropriate organization. Regular monthly meetings with contractor counterparts are important feedback sources. The Performance Evaluation and Measurement Plan, Part II of III, Section B of the M&O Contract Modification Number M100, provides specifics to the EM clean-up incentive. This area of the M&O contract provides the specific consequences for positive and negative performance, which includes poor safety and environmental performance. Contractors are encouraged to self identify and report problems and DOE may reduce fines and penalties in certain areas if they do so (for example, Price Anderson Act as amended activities).

- Effective and timely feedback is critical to identification of improvement opportunities. In addition to the SRS feedback mechanisms discussed above, the contractor's Lessons Learned Program sorts and screens lessons learned pertaining to the operation of facilities at DOE-SR, as well as other sites in the DOE complex and commercial nuclear and industrial facilities. The contractor's Lessons Learned Program prepares and distributes lessons learned documents to all site organizations for information and use as appropriate. The Lessons Learned Program is included as an area for review by DOE-SR when preparing to conduct oversight activities. DOE-SR line and program offices continually look for ways to improve contractor and DOE activities as part of the daily conduct of business. DOE-SR personnel observe and participate in contractor critiques. Technical Assessments and other evaluations of the contractor usually reveal opportunities for improvements, and committees that cut across organizational lines help disseminate information.

- Continuous improvement requires action in areas where feedback has been provided and opportunities for improvement have been identified. Specific direction to the contractor is given in accordance with contract provisions. Management direction and/or a change in procedure is used to effect change within DOE-SR. Changes made in response to an outside review are usually logged and tracked to closure, with a specific organization assigned the responsibility. With regard to enforcement actions, FRs and designated upper management are authorized to issue "Environment, Safety, and Health Stop Work Orders" when conditions merit.
- In addition to the elements discussed under Core Function 4, DOE P 450.5 also defines DOE field office oversight responsibility to include reviewing performance against formally established ES&H performance measures.

The requirements of DOE P 450.5, "Line Environment, Safety, and Health Oversight", have been incorporated in SRIP 223.4 (Technical Assessment Program) and SRIP 430.1 (FR Program). In accomplishing DOE-SR's oversight function, cognizant DOE-SR staff review contractor performance against formally established environment, safety and health performance measures and criteria set forth in the Performance Evaluation and Measurement Plan and in procedures and guidance for specific programs and activities, such as emergency drill/exercise evaluations; oversight of contractor training and qualification program activities; fire protection; radiation protection; environmental protection; and natural phenomena hazards mitigation. DOE-SR also uses information on reportable events that is documented and tracked in the Occurrence Reporting and Processing System to identify trends and to assess corrective action effectiveness.

- The M&O contractor maintains a number of key performance indicators (KPIs) that were developed jointly with and approved by DOE. Each KPI has an assigned owner and a subject matter expert (SME) by the contractor. DOE-SR has an assigned SME for each KPI. A number of the performance measures roll up to the DOE-SR Manager's attention, while others are used as tools by the DOE-SR staff. The KPI status is developed monthly and transmitted to DOE-SR with analysis indicating current status, trends, and actions being taken. Performance measure charts (Figure 6 next page) for the KPIs are available on ShRINE at <http://clemsn.srs.gov/index.htm>.

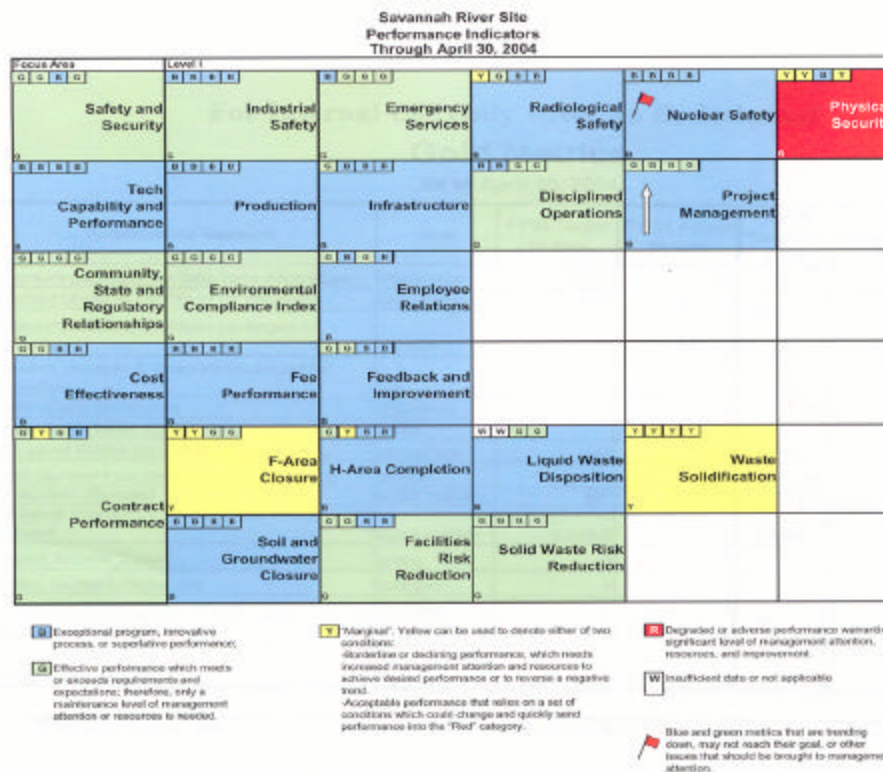


Figure 6 – Example of Key Performance Indicators

6.2.6 DOE-SR has established an ETMB. The Deputy Manager for Cleanup (DMC) chairs the Board. The members are DOE-SR line managers. The ETMB is chartered for the purpose of sustaining the DOE-SR culture of safety, security, competence, and technical excellence and institutionalizing the principles of ISM. The ETMB guides DOE-SR plans and actions and enables effective Site-wide integration in the following four areas:

- Capability of the Federal Workforce,
- Technical Assessment Program including the Facility Representative Program,
- Integrated Safety Management including Safety Basis Documentation, and
- Project Management System

The normal method of operation for the ETMB is to assign tasks to standing committees of DOE-SR staff chartered by the ETMB to oversee activities within the four areas listed above. The standing committees are:

- Technical Assessment Program Committee
- Facility Representative Council
- Nuclear Safety Council
- Project Evaluation Board

The standing committees have their own charters and periodically brief the Board.

Appendix
Documents Containing DOE-SR Safety Management System
Implementing Mechanisms

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DOE-HQ/Other Documents:

1. DOE M 411.1-1, Safety Management, Functions, Responsibilities, and Authorities Manual
2. DOE O 210.1, "Performance Indicator and Analysis of Operations Information"
3. DOE O 232.1A, "Occurrence Reporting and Processing of Operations"
4. DOE O 420.1, "Facility Safety"
5. DOE O 430.1, "Real Property Asset Management"
6. Doe O 435.1, "Radioactive Waste Management"
7. DOE O 451.1, "National Environmental Policy Act Compliance Program"
8. DOE P 430.1, "Land and Facility Use Planning"
9. DOE P 450.5, "Line Environment, Safety, and Health Oversight"
10. DOE-EM-STD-5502-94, "Hazard Baseline Documentation"
11. DOE-STD-1027-92, "Hazard Categorization and Accident Analysis Techniques for Compliance with DOE Order 5480.23, Nuclear Safety Analysis Reports"
12. DOE-HDBK-3027-99, "DOE ISMS Verification - Team Leader's Handbook"
13. 10 CFR 830, "Nuclear Safety Management"
14. 10 CFR 835, "Occupational Radiation Exposure"
15. 48 CFR "Federal Acquisition Requirements"
16. Department of Energy Office of Environmental Management Safety Management Functions, Responsibilities, and Authorities Document, Revision 3
17. M&O Contract Number DE-AC09-96SR18500, Modification Number M-100
18. WSRC-RC-94-1268, "SRS Standards and Requirements Identification Document"

Note: Westinghouse Savannah River Company's "Integrated Safety Management System Description" is documented as part of the SRS Standards/Requirements Identification Document (WSRC-RP-94-1268).

Wackenhut Services, Inc.'s "Integrated Safety Management System Description" is included in their S/RID FA-00 as an attachment.

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DOE-SR Documents:

1. SRIP 150.2, "Emergency Management Program"
2. SRIP 223.4, "DOE-SR Technical Assessment Program"
3. SRIP 223.5, "DOE-SR Self-Assessment Program"
4. SRIP 225.1, "Accident Investigations"
5. SRIP 251.2, "Oversight of Contractor S/RID Activities"
6. SRIP 253.1, "Preparation and Approval of DOE-SR Directives"
7. SRIP 361.1, "Oversight of Contractor Technical Training and Qualification Program Activities"
8. SRIP 420.1, "DOE-SR Notification to the Contractor of an Adverse Condition/Stop Work Order"
9. SRIP 421.1, "Nuclear Safety Oversight"
10. SRIP 425.1, "Nuclear Facility Startup Approval Process"
11. SRIP 430.1, "Facility Representative Program"
12. SRIP 440.1, "Fire Protection"
13. SRIP 440.3, "DOE-SR Federal Employee Occupation Safety and Health (FEOSH) Program"
14. SRIP 441.1, "Radiation Protection"
15. SRIP 450.1, "DOE-SR Environmental Protection Program"
16. SRIP 450.4 "Authorization Agreements"
17. SRM 130.2.1, "Management Plan for Planning, Budgeting, Work Authorization, and Control"
18. SRM 300.1.1, Chapter 1, Section 1.1, "DOE-SR Functions, Responsibilities and Authorities Procedure"
19. SRM 300.1.1, Chapter 1, Section 1.2, "DOE-SR Organizational Configuration Control Process"
20. SRM 300.1.1, Chapter 2, Section 2.1, "DOE-SR Position Management and Classification Process"
21. SRM 300.1.1, Chapter 3, Section 3.1, "Merit Promotion and Placement Process"
22. SRM 300.1.1, Chapter 5, Section 5.2, "DOE-SR Performance Management Process"

Appendix Cont'd

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DOE-SR Documents:

23. SRM 300.1.1, Chapter 6, Section 6.1, "Technical Training and Qualification Program"
24. SRM 300.1.1, Chapter 6, Section 6.2, "DOE-SR Training and Continuing Education Processes"
25. SRM 414.1.1, "Quality Assurance Program Manual"
26. SRM 435.1, "Radioactive Waste Management Manual"
27. SRM 410.1.1, "Project Management Manual"
28. SRP 01-06, "DOE-SR Employee Concerns Program"
29. SRP 04-03, "DOE-SR Environmental Management System Policy"
30. SRP 04-04, "Savannah River Site Workplace Safety, Health, & Security Policy"